Serial No. 10/736,650 Docket No. SUPERCON 23 Amendment A

## **AMENDMENTS TO THE CLAIMS:**

Kindly amend claim 1, and add new claims 10-12, as shown below.

This listing of claims will replace all prior versions and listings of claims in the Application:

Claim 1 (currently amended): A process for making superconducting material useful for forming electrolytic devices comprising the steps of:

- a) establishing multiple niobium or tantalum components in a primary billet of a ductile material;
- b) working the primary billet to a series of reduction steps to form said niobium or tantalum components into elongated elements;
- c) cutting and restacking the elongated elements from step [[d)]] b) and forming the cut elements into a stack around a metal core [[and];
- <u>d)</u> surrounding the stack <u>of cut and stacked elements from step c)</u> with a porous confining layer to form a secondary billet;
- [[d)]] e) working the secondary billet from step [[c)]] d) through a series of reduction steps; including twisting and rolling into thin ribbon with an Aspect Ratio of greater than 5:1;
- [[e)]] <u>f</u>) cutting the <u>elongated</u> <u>worked</u> billet from step [[d)]] <u>e</u>) into sections; and
  - [[f]] g) leaching the core and sheath at least in part.

Claim 2 (original): The process of claim 1, wherein said leaching is in an acid leach.

Claim 3 (original): The process of claim 1, wherein said leaching step is in a liquid metal bath.

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Serial No. 10/736,650 Docket No. SUPERCON 23 Amendment A

Claim 4 (original): The process of claim 3, wherein said liquid metal bath comprises molten magnesium.

Claim 5 (currently amended): The process of claim 1, wherein said porous confining layer contains a gap that renders [[it]] the confining layer circumferentially discontinuous, but overlapping.

Claim 6 (currently amended): The process of claim 1, wherein said porous confining layer contains a gap that renders [[it]] the confining layer circumferentially discontinuous.

Claim 7 (original): The process of claim 1, wherein several separate segments are used to construct a multi anode capacitor assembly.

Claim 8 (original): An electronic device made from the superconductor material formed by the process of claim 1.

Claim 9 (original): An electrolytic capacitor made from the superconductor material formed by the process of claim 1.

Claim 10 (new): The process of claim 1, wherein said metal core consists of a single metal rod.

Claim 11 (new): The process of claim 10, wherein said single metal rod has a cross-sectional area not exceeding 20% of said secondary billet before working.

Claim 12 (new): The process of claim 1, wherein the Aspect Ratio is 40:1.

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